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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/700,048	11/04/2003	Martine Lefebvre	LEFE3002/FJD	3102

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EXAMINER

TRIEU, VAN THANH

ART UNIT	PAPER NUMBER
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2636

DATE MAILED: 03/28/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/700,048

Applicant(s)

LEFEBVRE ET AL.

Examiner

Van T Trieu

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 04 November 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 9-16 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 9-16 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____

DETAILED ACTION

Claim Objections

1. Claim 14 is objected to because of the following informalities: the abbreviation of "DTM" should be spelled out. Appropriate correction is required.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 9, 10 and 14 are rejected under 35 U.S.C. 102(b) as being anticipated by **Larson et al** [US 6,850,973].

Regarding claim 9, the claimed method for the offline parametering of a field device for process automation technology with the help of an operating program B running on an operating device B comprising the step of: communicating an operating program with a field device over a data bus for online parametering and for which no device description is available describing the offline behavior of the field device (the method of reprogramming a field device 14, 15 or 40 in a process control network from a host device 18 via a standard communication bus 20, to transmit the downloaded new code to the field device 14, 15 or 40 while the device is enabled to perform processing control. Once the new code is downloaded and stored in the field device 14, 15 or 40,

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the field device is disabled from performing process control, reprogrammed to execute the downloaded code, and re-enabled to perform processing control, see Figs. 1 and 2, col. 1, lines 12-25, col. 4, lines 56-67, col. 5, lines 1-36, col. 6, lines 43-67, col. 7, lines 1-67 and col. 8, lines 1-23); and the communicating the operating program with a copy of the device software program running in the field device, thereby simulating an online field device (the personal computer run applications that enable an operator to perform functions with respect to the process, such as changing settings of the process control routine, modifying the operation of the control modules 24 within the controller 12, viewing the current state of the process, simulating the operation of the process for the purpose of testing the process control software, col. 1, lines 38-51, col. 3, lines 38-55 and col. 7, lines 1-40).

Regarding claim 10, all the claimed subject matters are cited in respect to claim 1 above, and including the device software program and the operating program are executed together on the operating device (the downloaded new codes software and the operating process are executed to update/reprogramming the operation functions of the field device 14, 15 or 40, see col. 7, lines 13-40).

Regarding claim 14, the claimed the copy of the device software program GS is surrounded by a DTM shell, which reads upon the HART or the Fieldbus protocols, see col. 1, lines 53-64, col. 10, lines 35-67, col. 11, lines 1-67 and col. 12, lines 1-18.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

3. Claims 15 and 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over **Larson et al** [US 6,850,973]

Regarding claim 15, **Larson et al** fails to disclose the operating device is a laptop computer unit. However, **Larson et al** teaches that the host workstation computer 18 is used to create or change the process control modules 24 and to download these control modules via the data bus 20 to one of the controllers 12, wherein the user/operator can view the applications or changes on a display using the user interface 27, see Fig. 1, col. 6, lines 43-55 and col. 7, lines 13-40. Therefore, it would have been obvious to one skill in the art to recognize that it is a user choice to substitute laptop computer for the

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PC for controlling and operating of the field because the portable laptop provides convenience to user/operator to freely moving working station from one to another and/or to another building, since the laptop computers are powerful as the PC and available in the market.

Regarding claim 16, **Larson et al** fails to disclose the parameter settings of the offline parametering are transferred to the field device manufacturer for pre-configuring of field device. However, **Larson et al** teaches that the distributed process control system 10 includes one or more process controllers 12 each includes a control modules 24 to establish or reprogram function blocks for each field devices 14, 15 or 40 over the communication network such as the HART or Fieldbus interfaces and the data bus 20. The functions blocks typically performs one of an input function, such as that associated with a transmitter, a sensor or other processor parameter measurement device, a control function such as associated with a control routine to perform some physical function within the process control system 10, see Figs. 1 and 2, col. 6, lines 43-67 and col. 5, lines 12. Therefore, it would have been obvious to one skill in the art to recognize that the distributed process control system can reprogramming or transferring of the pre-configuring process for each of the field devices, since the system can communicate over the Internet, Ethernet or world wide web at any location in the United State or worldwide.

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4. Claims 11-13 are rejected under 35 U.S.C. 103(a) as being unpatentable over **Larson et al** [US 6,850,973] in view of **Rosenberg et al** [US 6,366,272]

Regarding claim 11, **Larson et al** fails to disclose the copy of the device software program GS and the operating program B communicate over a virtual COM-interface. However, **Larson et al** teaches that the downloaded new codes and the field device operating modules 24 are reprogrammed or executed over the communication bus 20 and to view applications on a display using the user interface 27 by a user/operator host workstation 18, see Fig. 1, col. 6, lines 43-55 and col. 7, lines 13-40. **Rosenberg et al** suggests that the method and apparatus for providing a computer-simulated environment visually displaying simulated representations and providing force feedback sensations via a virtual interface 14 and a display 20 connected to a host computer system 12, see Figs. 1 and 2, col. 3, lines 25-50, col. 6, lines 18-67, col. 8, lines 34-50, col. 9, lines 7-67 and col. 10, lines 1-35. Therefore, it would have been obvious to one skill in the art at the time the invention was made to substitute the virtual interface of **Rosenberg et al** for the display interface of **Larson et al** for establishing a meaningful and intuitive correlation between the information displayed visually and the other operation information data received from the field devices.

Regarding claim 12, **Larson et al** fails to disclose the operating device has a Windows platform. However, **Larson et al** teaches that the host workstation computer 18 is used to create or change the process control modules 24 and to download these control modules via the data bus 20 to one of the controllers 12, wherein the user/operator can

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view the applications or changes on a display using the user interface 27, see Fig. 1, col. 6, lines 43-55 and col. 7, lines 13-40. **Rosenberg et al** suggests that the method and apparatus for providing a computer-simulated environment visually displaying simulated representations and providing force feedback sensations via a virtual interface 14 and a display 20 connected to a host computer system 12, which is a personal computer PC or workstation operated by Windows operating systems, see Figs. 1 and 2, col. 3, lines 25-50, col. 6, lines 18-67, col. 7, lines 37-59, col. 8, lines 34-50, col. 9, lines 7-67 and col. 10, lines 1-35. Therefore, it would have been obvious to one skill in the art at the time the invention was made to substitute the Windows PC of **Rosenberg et al** for workstation computer of **Larson et al** for providing information functions to users and for simulating sporting events and other events without losing information data.

Regarding claim 13, **Larson et al** fails to disclose the copy of the device software program GS is surrounded by a Windows shell. However, **Larson et al** according to the discussed of the Windows PC for creating and/or changing of application operations reprogramming to the field device operating modules 24 between **Larson et al** and **Rosenberg et al** in respect to claim 12 above, it would have been obvious to one skill in the art at to recognize that the software reprogramming is also surrounded by the Windows PC.

Conclusion

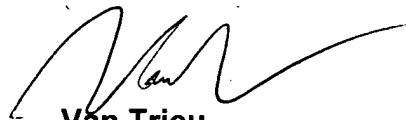
5. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Schrier et al discloses a method of downloading application information from a host device to a field device over a network providing communication and power to the field device. [US 6,055,633]

Burns et al discloses a field device for use in a process control network having a plurality of devices communicatively coupled by a two wire and digital communication bus. [US 5,970,430]

Verissimo et al discloses a system for configuring a process control system, a Fieldbus network having intelligent field mounted devices coupled to a data communication bus. A software representation of the process control system to be configured is first designed on a computer. [US 5,841,654]

6. Any inquiry concerning this communication or earlier communications from examiner should be directed to primary examiner **Van Trieu** whose telephone number is (571) 272-2972. The examiner can normally be reached on Mon-Fri from 7:00 AM to 3:00 PM. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mr. **Jeffery Hofsass** can be reached on (571) 272-2981.


Van Trieu
Primary Examiner
Date: 3/16/05